Ordering number: EN 4981

Monolithic Linear IC

LA6524

4-output Power Driver

Overview

The LA6524 is a 4-output power driver developed for use in consumer and industrial equipment.

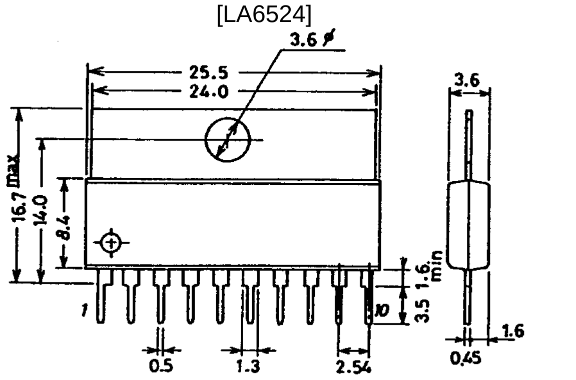
Functions

- Four buffer amp circuits on chip
- High output current (Io max = 0.5 A)
- Includes current limiter
- Broad operating voltage range (±2 to +12 V)
- Single power supply operation possible (4 to 24 V)
- Thermal shutdown circuit built-in.

Package Dimensions

unit : mm

3046B-SIP10F



Specifications

Maximum Ratings at Ta = 25 °C

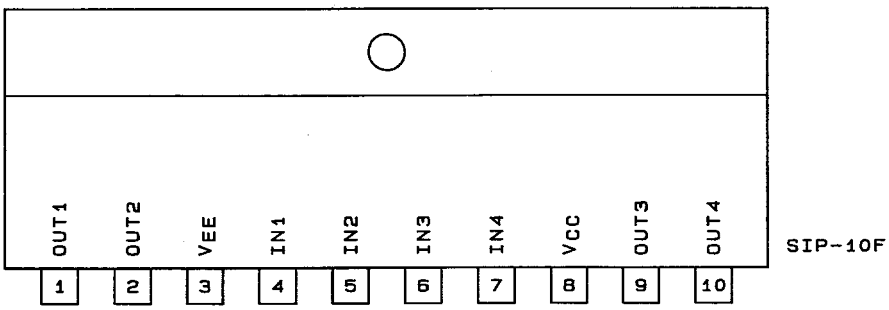
Parameter	Symbol	Conditions	Ratings	Unit
Maximum supply voltage	V_{CC}/V_{EE}		±15	V
Input voltage	V_{IN}		±14	V
Allowable power dissipation	Pd max	When using Al heat sink (50 x 50 x 1.5 mm^3)	2.0	W
Operating temperature	Topr		–20 to +75	°C
Storage temperature	Tstg		–40 to +125	°C

Operating Characteristics at Ta = 25 °C, V_{CC}/V_{EE} = ±10 V

Parameter	Symbol	Conditions	min	typ	max	Unit
Current drain with no load	I_{CC}			10	30	mA
Input offset voltage	V_{IO}	$R_S \leqq 10$ kΩ		2	7	mV
Input bias current	I_B			50	500	nA
Input voltage range	V_{ID}		–9		+8	V
Maximum output voltage	V_O	R_L = 33 Ω		±8		V
Slew rate	SR	R_L = 33 Ω , R1 = 2.2 Ω , C1 = 0.1 µF		0.15		V/µs
Limiter current (built-in type)	I_{SC}			0.5		A

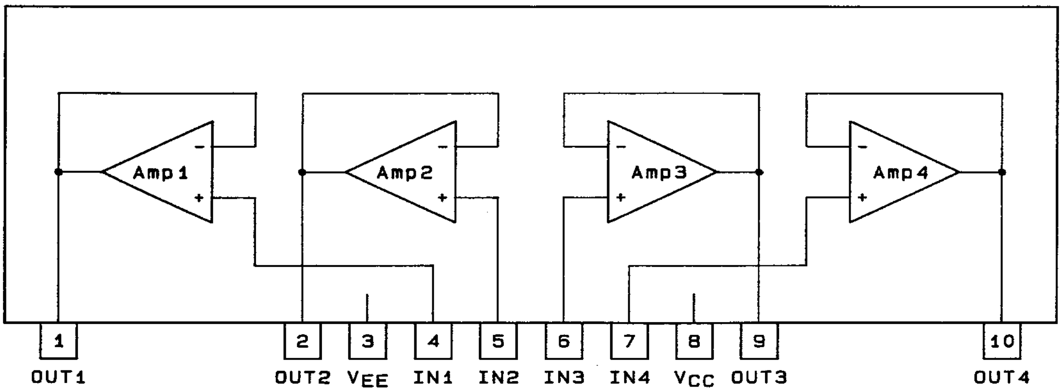
SANYO Electric Co.,Ltd. Semiconductor Bussiness Headquarters
TOKYO OFFICE Tokyo Bldg., 1-10, 1 Chome, Ueno, Taito-ku, TOKYO, 110 JAPAN

Pin Assignments



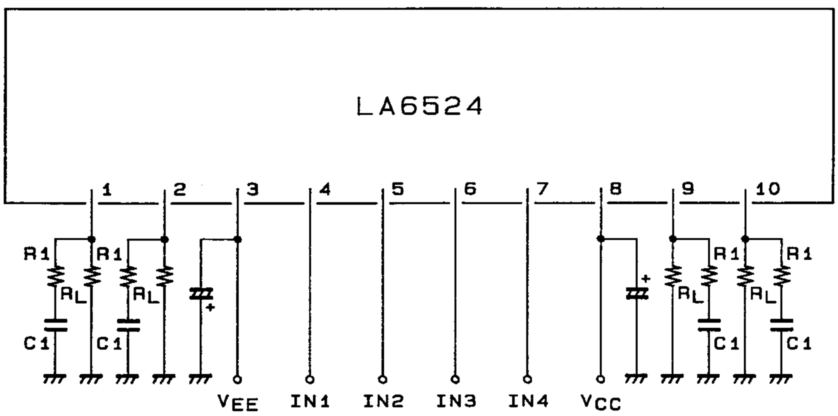
A03203

Block Diagram



A03204

Sample Application Circuit

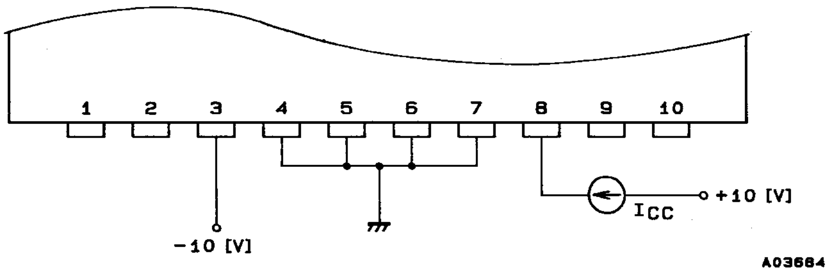


R_L = Load
R1 = 2.2[Ω]
C1 = 0.1[μF] (Film)

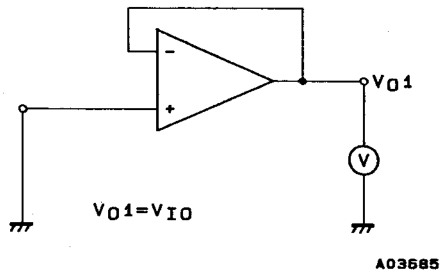
A03205

Test Circuit

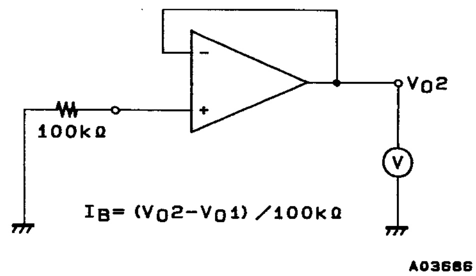
1. I_{CC}



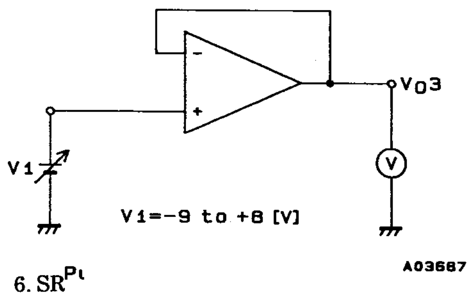
2. V_{IO}



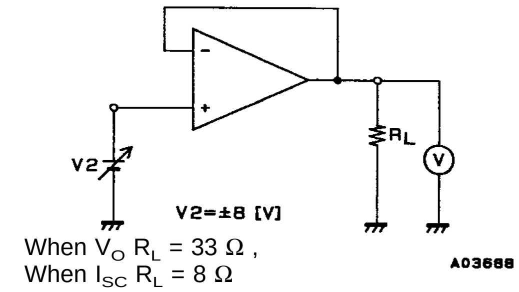
3. I_B



4. V_{ID}



5. V_O, I_{SC}



When V_O R_L = 33 Ω ,
When I_{SC} R_L = 8 Ω

6. SR

